



Plasticising admixture to increase the mechanical strength of concrete with dry consistency

DESCRIPTION

Vibromix C1 is a liquid admixture specifically developed for the production of vibro-compressed and extruded concrete components, made using a dry or slightly damp mix.

WHERE TO USE

With the product's special, innovative formulation, Vibromix C1 increases the compacting grade of the concrete when vibrated. The plasticising action of Vibromix C1, together with its property of increasing mechanical strength after short curing times, allows manufactured components to be made using the vibro-compression and extrusion technique, which have considerably reduced curing times and, therefore, handling times. Also, the performance characteristics are improved, such as mechanical strength and indirect traction, the components are more durable thanks to the reduced water absorption and have higher resistance to abrasion.

Vibromix C1 does not excessively modify the rheology of the fresh concrete, and may be introduced into the production cycle without taking any particular precautions.

Vibromix C1 is particularly suitable for:

- the production of vibro-compressed components, such as blocks, self-locking pieces, kerbs, man-holes, etc.:
- the production of extruded components, such as honey-comb floor slabs and large diameter pipes;
- the production of components which require quick stripping of formwork and/or reduced curing times.

TECHNICAL CHARACTERISTICS

Vibromix C1 is an active polymer-based admixture in an aqueous solution, which promotes the vibrocompression and extrusion action of moulds on fresh concrete. It also considerably increases mechanical strength after very short curing times, even in cold weather, to make components with considerably better performance levels and a more attractive appearance.

A better compacting grade allows uniform components to be manufactured with fewer defects and better surface finish.

COMPATIBILITY WITH OTHER PRODUCTS

Vibromix C1 is compatible with other admixtures used in the manufacture of high-quality concrete, and especially with:

- cloride-free hardening accelerator admixtures of the Mapefast range to reach high mechanical strength after short curing times, even in cold weather;
- Mapeplast SF, micro-silica-based powder, used in the production of "top-quality" concrete with high mechanical strength, waterproofing and durability properties:
- Vibromix S, integral waterproofer for the production of components with no efflorescence.

HOW TO USE

Add **Vibromix C1** in the cement mixer after all the other ingredients (cement, aggregates, water and, where required, oxide colorants). Mix well until a homogenous mix is obtained.



TECHNICAL DATA (typical values)

PRODUCT IDENTITY	
Appearance:	liquid
Colour:	amber
Density according to ISO 758 (g/cm³):	1.02 ± 0.02 at +20°C
Specific action:	compacting promoter for vibro-compressed concrete
Secondary action:	hardening accelerator
Classification according to EN 934-2:	water reducer, plasticiser, hardening accelerator, tables 2 and 7
Classification according to ASTM C494:	type E
Chlorides soluble in water according to EN 480-10 (%):	< 0.1 (absent according to EN 934-2)
Alkali content (Na ₂ O equivalent) according to EN 480-12 (%):	< 2.0
pH according to ISO 4316:	6.4 ± 1

CONSUMPTION

Dosage by volume:

from 0.2 to 0.8 l per 100 kg of cement. Different dosages from those suggested must be previously tested through concrete trials, in addition to consulting MAPEI Technical Services Department.

PACKAGING

Vibromix C1 is available in either bulk quantities, in 200 l drums or 1000 l tanks.

STORAGE

Vibromix C1 can be stored for 12 months in sealed containers. Protect from frost.

SAFETY INSTRUCTIONS FOR PREPARATION AND APPLICATION

Vibromix C1 is not considered a dangerous substance according to current regulations regarding the classification of mixtures. However, the use of protective gloves and goggles and the application of the usual precautions taken when handling chemical products are recommended.

For further and complete information about the safe use of our product please refer to the latest version of our Material Safety Data Sheet.

PRODUCT FOR PROFESSIONAL USE.

WARNING

Although the technical details and recommendations contained in this product data sheet correspond to the best of our knowledge and experience, all the above information must, in every case, be taken as merely indicative and subject to confirmation after long-term practical application; for this reason, anyone who intends to use the product must ensure beforehand that it is suitable for the envisaged application. In every case, the user alone is fully responsible for any consequences deriving from the use of the product.

Please refer to the current version of the Technical Data Sheet, available from our website www.mapei.com

All relevant references for the product are available upon request and from www.mapei.com

